Amendments to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

Claim 1. (currently amended). An isolated biopolymer marker ~~peptide~~ consisting of amino acid residues 2-18 of SEQ ID NO:1 ~~diagnostic for Alzheimers disease~~.

Claims 2-38. (cancelled)

Claim 39. (currently amended). A method for ~~diagnosing Alzheimers disease~~ determining the presence of an isolated biopolymer marker consisting of amino acid residues 2-18 of SEQ ID NO: 1 comprising:

(a) obtaining a sample from a patient;

(b) conducting mass spectrometric analysis on said sample in a manner effective to maximize ~~elucidation of discernible~~ analysis of peptide fragments contained therein and comparing mass spectrum profiles of said isolated biopolymer marker consisting of amino acid residues 2-18 of SEQ ID NO:1 to mass spectrum profiles of

peptides obtained and analyzed from said sample; and

~~c) comparing mass spectrum profiles of a peptide consisting of amino acid residues 2-18 of SEQ ID NO:1 to mass spectrum profiles of peptides elucidated from said sample, wherein recognition of a mass spectrum profile in the sample displaying the characteristic profile of the mass spectrum profile for the peptide consisting of amino acid residues 2-18 of SEQ ID NO:1 is diagnostic for Alzheimers disease~~

(c) confirming the presence of said isolated biopolymer marker consisting of amino acid residues 2-18 of SEQ ID NO:1 in said sample displaying a peak profile at about 1826 daltons in said mass spectrum profile;

wherein the presence of said isolated biopolymer marker consisting of amino acid residues 2-18 of SEQ ID No:1 is indicative of a link to Alzheimer's disease.

Claim 40. (currently amended). The method of claim 39, wherein [[the]] said sample is an unfractionated body fluid or a tissue sample.

Claim 41. (previously presented). The method of claim 39, wherein said sample is selected from the group consisting of blood, blood products, urine, saliva, cerebrospinal fluid, and lymph.

Claim 42. (previously presented). The method of claim 39, wherein said mass spectrometric analysis is selected from the group consisting of Surface Enhanced Laser Desorption Ionization (SELDI) mass spectrometry (MS), Maldi Qq TOF, MS/MS, TOF-TOF, ESI-Q-TOF and ION-TRAP.

Claim 43. (previously presented). The method of claim 39, wherein said patient is a human.

Claim 44. (currently amended). ~~An Alzheimers disease diagnostic kit~~ A kit for determining the presence of an isolated biopolymer marker consisting amino acid residues 2-18 of SEQ ID NO:1 comprising: (a) a peptide consisting of amino acid residues 2-18 of SEQ ID NO:1, and (b) an antibody that binds to said peptide in a sample from a patient.

Claim 45. (currently amended). The ~~diagnostic assay~~ kit of claim 44, wherein said antibody is immobilized on a solid support.

Claim 46. (currently amended). The ~~diagnostic~~ kit of claim 44, wherein said antibody is labeled.